

## **Senior and Junior DSP Audio Engineer/Programmer – TechGenies**

*An innovative startup revolutionizing the DJ industry with cutting-edge audio technology, aiming to create a groundbreaking DJ audio application featuring automated DJing and advanced audio manipulation tools.*

### **1. Senior DSP Audio Engineer/Programmer**

**Major:** degree in Computer Engineering, Computer Science, or any related field.

**Experience:** 3-5 years of proven experience

#### **Major Responsibilities:**

- Develop, implement and optimize state-of-the-art digital signal processing (DSP) algorithms to enhance listening experience, performance, and functionality within the DJ application.
- Design and optimize audio processing pipelines to minimize latency and maximize real-time performance.
- Collaborate with software engineers, UI/UX designers, and domain experts to integrate advanced audio features seamlessly into the application.
- Conduct thorough testing, both digitally and sonically, and debugging to ensure the stability, reliability, and quality of audio processing algorithms and features.
- Stay abreast of the latest developments in audio technology, DSP techniques, AI and industry trends to continuously improve the DJ application.
- Provide technical guidance and support to team members on audio-related issues and challenges.

#### **Additional Requirements:**

- Focus on DSP Programming.
- Commercial experience as an Audio-specific DSP engineer.
- Proficiency in digital signal processing theory, algorithms, and implementation techniques.
- Strong DSP programming skills in languages such as C/C++, Python, and MATLAB.
- In-depth knowledge of digital audio formats, audio codecs, and audio processing techniques.
- Familiarity with music theory, audio synthesis, and sound design principles.
- Experience with audio and filter programming and with industry standard libraries and frameworks.
- Experience with machine learning, AI techniques, and their application to audio processing is a plus.
- Passion for music, sound technology, and a strong desire to push the boundaries of innovation in the DJ industry.

### **2. Junior DSP Audio Engineer/Programmer**

**Major:** degree in Computer Engineering, or any related field.

**Experience:** 0 – 2 years of proven experience

#### **Major Responsibilities:**

- Develop, implement and optimize state-of-the-art digital signal processing (DSP) algorithms to enhance listening experience, performance, and functionality within the DJ application.

- Design and optimize audio processing pipelines to minimize latency and maximize real-time performance.
- Collaborate with software engineers, UI/UX designers, and domain experts to integrate advanced audio features seamlessly into the application.
- Conduct thorough testing, both digitally and sonically, and debugging to ensure the stability, reliability, and quality of audio processing algorithms and features.
- Stay abreast of the latest developments in audio technology, DSP techniques, AI and industry trends to continuously improve the DJ application.
- Provide technical guidance and support to team members on audio-related issues and challenges.

#### Additional Requirements:

- Focus on DSP Programming.
- Commercial experience as an Audio-specific DSP engineer.
- Proficiency in digital signal processing theory, algorithms, and implementation techniques.
- Strong DSP programming skills in languages such as C/C++, Python, and MATLAB.
- In-depth knowledge of digital audio formats, audio codecs, and audio processing techniques.
- Familiarity with music theory, audio synthesis, and sound design principles.
- Experience with audio and filter programming and with industry standard libraries and frameworks.
- Demonstrated ability to work in a collaborative team environment and communicate effectively with cross-functional team members.
- Experience with machine learning, AI techniques, and their application to audio processing is a plus.
- Passion for music, sound technology, and a strong desire to push the boundaries of innovation in the DJ industry.

#### How to Apply:

Kindly send your CV or contact the Career Services Center, E-mail: [career.services@balamand.edu.lb](mailto:career.services@balamand.edu.lb), Ext. 7801; 7802